

DETAILED ACTION

Claim Rejections - 35 USC § 103

The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

Claims 1-7, 9-10, 27-34, 36 and 39-47 and 49-54 are rejected under 35 U.S.C. 103(a) as being unpatentable over Maguire et al. (USPN 5,755,760) in view of Leob et al. (USPN 6,286,512).

Regarding claims 1, 27, 30 and 47, Maguire et al. disclose a device comprising: a single, relatively short tubular shaft (460 and alternate/equivalent counterparts in other embodiments) defining a distal region and a proximal region; a coagulation element or means for coagulating tissue (12 and/or 16 and alternate/equivalent counterparts in other embodiments) defining a coagulation element configuration on the distal region of the relatively short tubular shaft; and a stimulation element or means for stimulating tissue (20 and alternate/equivalent counterparts in other embodiments) defining a stimulation element configuration on the distal region of the same relatively short tubular shaft, the stimulation element configuration being different than the coagulation element

configuration, see col. 3-16, col. 3, line 43 through col. 7, line 45 in particular and figures 1-16. Maguire et al. further disclose a source of stimulation energy and a source of coagulation energy, col. 14, line 24 through col. 15, line 18 and figure 16. Maguire et al. fail to explicitly disclose that the mapping electrode(s) is (are) stimulation electrode(s). It is well known in the art that mapping electrodes send and receive electrical signals in order to electrical “map” tissue. Additionally, Maguire et al. disclose a mapping electrode (52) of one embodiment also delivers stimulation energy, see col. 6, lines 1-10. Leob et al. disclose an electrosurgical device and teach providing the device with “spaced mapping electrode rings 715 for monitoring parts of the body. Such mapping electrodes are known in the art and, for example, provide for electrically mapping the heart by receiving and transmitting electrical signals related to the operation of that organ to recording signal processing and display devices,” see col. 15, lines 51-61. Therefore at the time of the invention it would have been obvious to one of ordinary skill in the art to modify the invention of Maguire et al., as taught by Leob et al., to explicitly recite that mapping electrodes transmit electrical energy in addition to receive electrical energy in order map cardiac tissue.

Regarding claims 2-4 and 31-33, Maguire et al. disclose the claimed invention, see figures 1-9B.

Regarding claims 5, 6, 9, 10, 34, 49, 50, 53 and 54, Maguire et al. disclose the claimed invention, see col. 3, line 43 through col. 4, line 14 and figures 1-9B.

Regarding claim 36, et al. further disclose the source of stimulation energy is configured for monitoring electrical impulses sensed by the stimulation element, see col. 3-16, col. 3, line 43 through col. 7, line 45 in particular and figures 1-16.

Regarding claim 28 and 29, Maguire et al. further disclose a coagulation energy line (102 and 104 and alternate/equivalent counterparts in other embodiments) connected to the coagulation element and to a coagulation energy connector configured to be connected to the source of coagulation energy; and a stimulation energy line (118 and alternate/equivalent counterparts in other embodiments) connected to the stimulation element and to a stimulation energy connector configured to be connected to the source of stimulation energy. It should be further noted that the stimulation element and the coagulation element have different configurations, see col. 3-16, col. 3, line 43 through col. 7, line 45 in particular and figures 1-16.

Regarding claims 39 and 43, Maguire et al. further disclose the coagulation element and the stimulation element are carried on the same relatively short tubular shaft such that the coagulation element and the stimulation element are longitudinally fixed relative to one another, see col. 3, line 43 through col. 7, line 45 in particular and figures 1-9B.

Regarding claims 40 and 44, Maguire et al. further disclose the distal portion of the relatively short tubular shaft includes a unitary outer member (14 16 and alternate/equivalent counterparts in other embodiments) and the coagulation element and

the stimulation element are both carried on the unitary outer member, see col. 3-16, col. 3, line 43 through col. 7, line 45 in particular and figures 1-16.

Regarding claims 42 and 46, Maguire et al. further disclose the coagulation element and the stimulation element define respective diameters and the diameter of the coagulation element is substantially equal to the diameter of the stimulation element, see col. 3-16, col. 3, line 43 through col. 7, line 45 in particular and figures 1-16.

Regarding claims 51 and 52, Maguire et al. further disclose the relatively short shaft is linear, see col. 3-16, col. 3, line 43 through col. 7, line 45 in particular and figures 1-16.

Claims 8, 35, and 48 are rejected under 35 U.S.C. 103(a) as being unpatentable over Maguire et al. (USPN 5,755,760) in view of Leob et al. (USPN 6,286,512) as applied to claims 1, 27 and 47 above, and still further in view of Haissaguerre et al. (USPN 6,063,080).

Regarding claims 8, 35 and 48, Maguire et al.) in view of Leob et al. disclose the claimed invention except for at least a portion of the distal region of the relatively short tubular shaft is malleable. Haissaguerre et al. disclose a catheter having steering capability and electrodes (28) and teach providing the distal portion of the catheter (40) with shape memory material in the form of nickel-titanium in order to set the shape of the distal portion, see col. 3, lines 35-51 and figures 1-8, Therefore at the time of the invention it would have been obvious to one of ordinary skill in the art to modify the

invention of Maguire et al.) in view of Leob et al., as taught by Haissaguerre et al., to provide the distal portion of the catheter with shape memory material in the form of nickel-titanium in order to set the shape of the distal portion.

Response to Arguments

Applicant's arguments with respect to claims 1-6, 8-10, 27-36, 39, 40, 42-44 and 46-54 have been considered but are moot in view of the new ground(s) of rejection.

Although a new grounds of rejection has been presented, the examiner believes the following comments in response to some of Applicant's arguments/remarks may expedite prosecution. Applicant has asserted that the mapping electrodes are not stimulation elements/electrodes. Maguire et al. discloses that a mapping electrode also serves as a stimulation electrode. Additionally, as is well known in the art, Leob et al. disclose that the mapping electrodes both send and receive electrical signals in order to map tissue. Clearly these mapping electrodes are stimulation electrodes.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to AARON ROANE whose telephone number is (571)272-4771. The examiner can normally be reached on Monday-Friday 5:30AM-3PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Linda Dvorak can be reached on (571) 272-4764. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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